



Early Journal Content on JSTOR, Free to Anyone in the World

This article is one of nearly 500,000 scholarly works digitized and made freely available to everyone in the world by JSTOR.

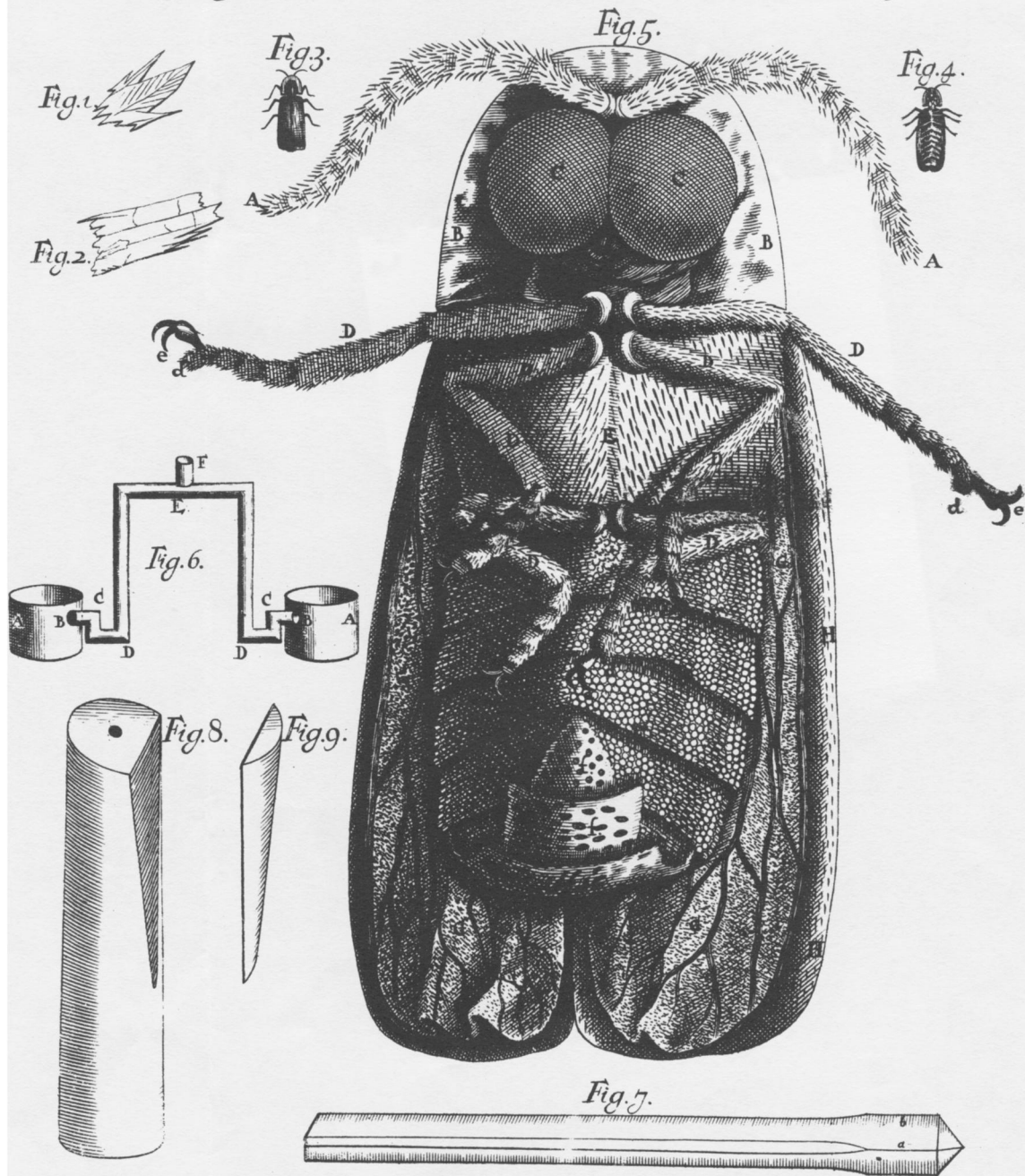
Known as the Early Journal Content, this set of works include research articles, news, letters, and other writings published in more than 200 of the oldest leading academic journals. The works date from the mid-seventeenth to the early twentieth centuries.

We encourage people to read and share the Early Journal Content openly and to tell others that this resource exists. People may post this content online or redistribute in any way for non-commercial purposes.

Read more about Early Journal Content at <http://about.jstor.org/participate-jstor/individuals/early-journal-content>.

JSTOR is a digital library of academic journals, books, and primary source objects. JSTOR helps people discover, use, and build upon a wide range of content through a powerful research and teaching platform, and preserves this content for future generations. JSTOR is part of ITHAKA, a not-for-profit organization that also includes Ithaka S+R and Portico. For more information about JSTOR, please contact support@jstor.org.

Philosoph. Transact. Number, 167.



M. Burghers sculp.

The Description of a Siphon, performing the same things with the Siphon Wurtembergicus; invented by Dr. Papin Fellow of the Royal Society.

IN tractatu de *Siphone Wurtembergico* qui *Stutgardiae* auctore Do. Salomone Reifelio nuper editus est magna quædam atque inaudita, si & utilitatem & raritatem & artificium spectes, de novo illo siphone prædicantur; ipsius autem proprietates characteristicæ proponuntur his verbis: 1^o. *Ut orificia crurum duorum Siphonis sui horizontaliter sita labris inferantur; cum in veterum inventis crus longius infra labrum seu æquilibrium descendat semper.* 2. *Ut orificiis vel partim vel ad dimidium aqua repletis, effluat tamen aqua super montem ducta; cum in reliquis Siphonibus totum orificium aqua adimpleri seu immergi aqua debeat.* 3. *Ut in siccitate diuturna quiescens machina tamen effectum producat affluente iterum aqua.* 4. *Ut lumine seu orificio alterutro aperto, altero vero post horas demum aut diem seu per epistomium seu conum recluso, effluat tamen aqua; cum in aliis utraque simul lumina aperiri debeant.* 5. *Ut in horizontali linea positis orificiis, & æqualibus quoad altitudinem cruribus exundet liquor; cum in Portæ aliorumque Machinis inæqualia debeant crura esse, & perpendiculum majus.* 6. *Ut ab utroque labro in utrumque labrum infusa ascendat & effluat aqua; cum in veteribus non nisi per unicum nempe longius, crus effluat, nunquam refluat.* Hæc sunt ipsius verba Authoris, qua vero ratione, quibusve auxiliis tanti effectus produci possint, ne verbum quidem: Me, itaque, Jussit Regia Societas Machinam construere, quæ eadem illa in libro descripta Phænomena exhiberet, ut clarissimus author de orbe litterato multoties tam bene meritus, ad ultiores Siphonis sui proprietates & usus detegendos provocetur: quum quæ de eo hætenus edita sunt cuncta, tam facili negotio ab aliis effecta viderit. Rem igitur tribus variis modis exequutus sum; ne vero

tædiosus nimium videar, sequentem methodum utpot facillimam instar omnium fore arbitror.

AA. sunt duo vasa metallica quibus duæ Siphonis extremitates inferuntur.

BCDEDCB. est Siphon cujus lumina. BB. in eadem Horizontali linea disponenda sunt.

F. Est tubulus foramini in superiori Siphonis parte adferruminatus, diligenterque obturandus, postquam Siphon aqua exacte repletus fuerit. Jam manifestum est aquam in partibus CD. contentam, aeri externo ingressum prohibere ne ad superiorem Siphonis partem E. penetret: Siphon igitur aqua semper plenus (modo debitam altitudinem non excedat,) effectum suum certissime producet, statim atque aqua in vasis A contenta alterutrius orificii B partem aliquam replebit: quumque ambobus orificiis aqua partim repletis, in utroque vase A ad eandem horizontalem lineam superficies aquæ pervernerit, si alterutri Vasi vel tantillum aquæ infuderis, pars ejus per siphonem statim in alterum Vas deferetur, eademque ratione cætera in libro descripta phænomena exhiberi poterunt: maximus enim ejusmodi siphon hactenus constructus viginti pedum altitudinem non superat.